

RAW SEQUENCE LISTING

**The Biotechnology Systems Branch of the Scientific and Technical
Information Center (STIC) no errors detected.**

Application Serial Number: 09/484,964A
Source: IFW/b
Date Processed by STIC: 7/10/06

ENTERED



IFW16

RAW SEQUENCE LISTING

DATE: 07/10/2006

PATENT APPLICATION: US/09/484,964A

TIME: 12:30:50

Input Set : F:\Utsh248US.TXT

Output Set: N:\CRF4\07102006\I484964A.raw

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4 <110> APPLICANT: YEH, EDWARD T.H.
6 <120> TITLE OF INVENTION: USES FOR A NOVEL CELL-DEATH-PROTECTING PROTEIN
8 <130> FILE REFERENCE: UTSH:248US
10 <140> CURRENT APPLICATION NUMBER: 09/484,964A
11 <141> CURRENT FILING DATE: 2000-01-18
13 <150> PRIOR APPLICATION NUMBER: 08/964,162
14 <151> PRIOR FILING DATE: 1997-11-04
16 <150> PRIOR APPLICATION NUMBER: 60/030,302
17 <151> PRIOR FILING DATE: 1996-11-05
19 <160> NUMBER OF SEQ ID NOS: 18
20 <170> SOFTWARE: PatentIn Ver. 2.0
23 <210> SEQ ID NO: 1
24 <211> LENGTH: 1465
25 <212> TYPE: DNA
26 <213> ORGANISM: Homo sapiens
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28 <221> NAME/KEY: CDS
29 <222> LOCATION: (88)..(390)
W--> 30 <400> SEQUENCE: 1
31 cgggaaggat ttgtaaacc cggagcgagg ttctgcttac cggaggccgc tgctgtgctg 60
32 agacccccgg gtgaagccac cgtcatc atg tct gac cag gag gca aaa cct tca 114
33 Met Ser Asp Gln Glu Ala Lys Pro Ser
34 1 5
35 act gag gac ttg ggg gat aag aag caa ggt gaa tat att aaa ctc aaa 162
36 Thr Glu Asp Leu Gly Asp Lys Lys Gln Gly Glu Tyr Ile Lys Leu Lys
37 10 15 20 25
38 gtc att gga cag gat agc agt gag att cac ttc aaa gtg aaa atg aca 210
39 Val Ile Gly Gln Asp Ser Ser Glu Ile His Phe Lys Val Lys Met Thr
40 30 35 40
41 aca cat ctc aag aaa ctc aaa gaa tca tac tgt caa aga cag ggt gtt 258
42 Thr His Leu Lys Lys Leu Lys Glu Ser Tyr Cys Gln Arg Gln Gly Val
43 45 50 55
44 cca atg aat tca ctc agg ttt ctc ttt gag ggt cag aga att gct gat 306
45 Pro Met Asn Ser Leu Arg Phe Leu Phe Glu Gly Gln Arg Ile Ala Asp
46 60 65 70
47 aat cat act cca aaa gaa ctg gga atg gag gaa gaa gat gtg att gaa 354
48 Asn His Thr Pro Lys Glu Leu Gly Met Glu Glu Glu Asp Val Ile Glu
49 75 80 85
50 gtt tat cag gaa caa acg ggg ggt cat tca aca gtt tagatattct 400
51 Val Tyr Gln Glu Gln Thr Gly Gly His Ser Thr Val
52 90 95 100
53 ttttattttt tttcttttcc ctcaatcctt ttttattttt aaaaatagtt cttttgtaat 460
54 gtgggtgttca aaacggaatt gaaaactggc accccatctc tttgaaacat ctggtaattt 520

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55 gaattctagt gctcattatt cattattggt tgttttcatt gtgctgattt ttggtgatca 580
56 agcctcagtc cccttcatat taccctctcc tttttaaaaa ttacgtgtgc acagagaggt 640
57 cacctttttc aggacattgc attttcaggc ttgtgggtgat aaataagatc gaccaatgca 700
58 agtgttcata atgactttcc aattggccct gatgttcagc atgtgattac ttcactcctg 760
59 gactgtgact ttcagtggga gatggaagtt tttcagagaa ctgaactgtg gaaaaatgac 820
60 ctttccttaa cttgaagcta cttttaaaat ttgaggggtct ggaccaaag aagaggaata 880
61 tcaggttgaa gtcaagatga cagataaggt gagagtaatg actaactcca aagatggctt 940
62 cactgaagaa aaggcatttt aagatttttt aaaaatcttg tcagaagatc ccagaaaagt 1000
63 tctaattttc attagcaatt aataaagcta tacatgcaga aatgaatata acagaacact 1060
64 gctcttttta gattttatgt gtactttttg gcctgggata tgggttttaa atggacattg 1120
65 tctgtaccag cttcattaaa ataaacaata tttgtcaaaa atcgtactaa tgcttatttt 1180
66 attttaattg tatagaaaga aaaaaatgcc taaaataagg ttttcttgca taaatactgg 1240
67 aaattgcaca tgggtacaaat tttttcttca ttactgtaca gggatgatgt taatgacttt 1300
68 ggagcactga aagttactga agtgccttct gaatcaagga ttttaattaag gccacaatac 1360
69 ctttttaata ctcagtgttc tgtttttttt aaaaacttga tattcccgtg tgggtgcatat 1420
70 ttgatacagg tacccaatca tgttggataa atgggcatgc cagcc 1465

```

72 <210> SEQ ID NO: 2

73 <211> LENGTH: 101

74 <212> TYPE: PRT

75 <213> ORGANISM: Homo sapiens

77 <400> SEQUENCE: 2

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78 Met Ser Asp Gln Glu Ala Lys Pro Ser Thr Glu Asp Leu Gly Asp Lys
79 1 5 10 15
80 Lys Gln Gly Glu Tyr Ile Lys Leu Lys Val Ile Gly Gln Asp Ser Ser
81 20 25 30
82 Glu Ile His Phe Lys Val Lys Met Thr Thr His Leu Lys Lys Leu Lys
83 35 40 45
84 Glu Ser Tyr Cys Gln Arg Gln Gly Val Pro Met Asn Ser Leu Arg Phe
85 50 55 60
86 Leu Phe Glu Gly Gln Arg Ile Ala Asp Asn His Thr Pro Lys Glu Leu
87 65 70 75 80
88 Gly Met Glu Glu Glu Asp Val Ile Glu Val Tyr Gln Glu Gln Thr Gly
89 85 90 95
90 Gly His Ser Thr Val
91 100

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93 <210> SEQ ID NO: 3

94 <211> LENGTH: 774

95 <212> TYPE: DNA

96 <213> ORGANISM: Homo sapiens

W--> 97 <220> FEATURE:

98 <221> NAME/KEY: modified_base

99 <222> LOCATION: (53)

100 <223> OTHER INFORMATION: Y = C or T

W--> 101 <220> FEATURE:

102 <221> NAME/KEY: modified_base

103 <222> LOCATION: (689)

104 <223> OTHER INFORMATION: N = A, C, G or T

W--> 105 <220> FEATURE:

106 <221> NAME/KEY: modified_base

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Input Set : F:\Utsh248US.TXT

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107 <222> LOCATION: (739)
108 <223> OTHER INFORMATION: N = A, C, G or T
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110 <221> NAME/KEY: modified_base
111 <222> LOCATION: (744)
112 <223> OTHER INFORMATION: N = A, C, G or T
114 <400> SEQUENCE: 3
115 cggcacgagg gtgctgcttg tgtgctcggt tggcgcgac ctggtacctc ttttgtgaa 60
116 gggcgagctg aggagactcc ggcgctcgcc atggccgacg aaaagcccaa ggaaggagtc 120
117 aagactgaga acaacgatca tattaatttg aagggtggcg ggcaggatgg ttctgtggtg 180
118 cagtttaaga ttaagaggca tacaccactt agtaaactaa tgaaagccta ttgtgaacga 240
119 cagggattgt caatgaggca gatcagattc cgatttgacg ggcaaccaat caatgaaaca 300
120 gacacacctg cacagttgga aatggaggat gaagatacaa ttgatgtgtt ccaacagcag 360
121 acgggaggtg tctactgaaa agggaacctg cttctttact ccagaactct gttctttaaa 420
122 gaccaagatt acattctcaa ttagaaaact gcaatttggg tccaccacat cctgactact 480
123 accgtatagt tttctctatt ctttcatttc ccccttcccc attcctttat tgtacataaa 540
124 gtaactggta tatgtgcaca agcatattgc attttttttt tttttaacta aacagccaat 600
125 ggtatgtttt gattgacatc caagtggaga cggggatggg gaaaaatact gattctgtgg 660
W--> 126 aaaatacccc cttttctccc attagtggnc atgctccatt cagcccttaa acctttataa 720
127 tcccaggtaa ggtaatttng ccncaccgg ttttaccxaa aaaaaaaaaa actt 774
129 <210> SEQ ID NO: 4
130 <211> LENGTH: 95
131 <212> TYPE: PRT
132 <213> ORGANISM: Homo sapiens
134 <400> SEQUENCE: 4
135 Met Ala Asp Glu Lys Pro Lys Glu Gly Val Lys Thr Glu Asn Asn Asp
136 1 5 10 15
137 His Ile Asn Leu Lys Val Ala Gly Gln Asp Gly Ser Val Val Gln Phe
138 20 25 30
139 Lys Ile Lys Arg His Thr Pro Leu Ser Lys Leu Met Lys Ala Tyr Cys
140 35 40 45
141 Glu Arg Gln Gly Leu Ser Met Arg Gln Ile Arg Phe Arg Phe Asp Gly
142 50 55 60
143 Gln Pro Ile Asn Glu Thr Asp Thr Pro Ala Gln Leu Glu Met Glu Asp
144 65 70 75 80
145 Glu Asp Thr Ile Asp Val Phe Gln Gln Gln Thr Gly Gly Val Tyr
146 85 90 95
148 <210> SEQ ID NO: 5
149 <211> LENGTH: 1733
150 <212> TYPE: DNA
151 <213> ORGANISM: Homo sapiens
W--> 152 <220> FEATURE:
153 <221> NAME/KEY: modified_base
154 <222> LOCATION: (19)
155 <223> OTHER INFORMATION: N = A, C, G or T
157 <400> SEQUENCE: 5
W--> 158 ttccggcacag gcgggaganc ggcggggccg aagcgtgaac tcgcccgcgc cggcttgctt 60
159 cccccgcgcc gcctccccgc gccgctcgga agccatgtcc gaggagaagc ccaaggaggg 120
160 tgtgaagaca gagaatgacc acatcaacct gaagggtggcc gggcaggacg gctccgtggt 180

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161 gcagttcaag atcaagaggc acacgtcgct gagcaagctg atgaaggcct actgcgagag 240
162 gcagggcctt tcaatgaggc agatcagatt cagggttcgac gggcagccaa tcaatgaaac 300
163 tgacactcca gcacagctga gaatggagga cgaggacacc atcgacgtgt tccagcagca 360
164 gacgggaggt gtgccggaga gcagcctggc agggcacagt ttctagaggg cccgtcccca 420
165 gcccgggccc tccatcctcg cattgctgtt gaattggtgag cacgtgacca tgccgaccac 480
166 aaaggtgtct gcggaaaactc gaggacattc accacgatga ttttcctctc tttgatgtac 540
167 ttcaagtgca actcaaaact atatctgcag ggatgaatct gtaacttaaa ttgggccaat 600
168 cagaattgtt atctttgttc aggtaaaatg agttgcaaga tattgtgggt acttttgtgt 660
169 gctcatttgt gttttccccc cctcctacaa cattttttta accccaaaat tatagcctga 720
170 atgttcgctt ttagtctggc cagggatctg actcctgagt tggttgcctc tcccctgctc 780
171 actccagtca catagagaat tgggtgtttcc cgcagtgggg attgcagctg ttggacaggt 840
172 attgggggca aggttggtag ggaggacaga ctgtcacttg ctgttacagg cacaggtgat 900
173 taaaatgcta aatattgcaa atttaagctt tgtcagtata tggaaaagtt gaagggaaaa 960
174 tactggaatg cttcttcaaa ggtaaaaaaa taaccgagtc ttttggtaat ttgacccac 1020
175 gtgctctctg gccctcaagc atgtaacctc ggggtctgag gcccaggacc caccctctg 1080
176 ccacccctcc caccctactc cctgctcagt acctggcggt ggtacacagg caaggattgg 1140
177 cacaacaaaa attggccttt ttctccctct taatattgaa gaaattccca catttctcat 1200
178 ttggtaatgg tgttgtggcc tcagatttct tctagtattt gcttctgatg aatgattatg 1260
179 gtctatacat aaaaaagtaa gactaagtat tgctgaattt gcagttatgt tgtcgtgat 1320
180 aagagctact tccaagtgtg gttacaaatg aacctatgga atgatgactt catgttcttc 1380
181 tcgtgggttt gtgccgtgct gctttccaaa taggtattga atttatgcat tagtctggtg 1440
182 atttcagttc tgtgaaatat ttgggatct ataccaatta aacattttca tagttctgcc 1500
183 tattgtcctt ccctgaggct ccattgctgc ttggtggcca ttctctgcct ttttacagtc 1560
184 acctgaacaa tgacccatca tctcttgctt gcttgaaatc ttgctgaaat gttctcattt 1620
185 cctgtttgct gtatgggctc ggggtgggatg tttgttggt ctgttggtt tattcaccaa 1680
186 tttgtacatt atttgttgct ctttactact gtaaacagta aatatagttt ggt 1733

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188 <210> SEQ ID NO: 6

189 <211> LENGTH: 103

190 <212> TYPE: PRT

191 <213> ORGANISM: Homo sapiens

193 <400> SEQUENCE: 6

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194 Met Ser Glu Glu Lys Pro Lys Glu Gly Val Lys Thr Glu Asn Asp His
195   1           5           10           15
196 Ile Asn Leu Lys Val Ala Gly Gln Asp Gly Ser Val Val Gln Phe Lys
197           20           25           30
198 Ile Lys Arg His Thr Ser Leu Ser Lys Leu Met Lys Ala Tyr Cys Glu
199           35           40           45
200 Arg Gln Gly Leu Ser Met Arg Gln Ile Arg Phe Arg Phe Asp Gly Gln
201           50           55           60
202 Pro Ile Asn Glu Thr Asp Thr Pro Ala Gln Leu Arg Met Glu Asp Glu
203           65           70           75           80
204 Asp Thr Ile Asp Val Phe Gln Gln Gln Thr Gly Gly Val Pro Glu Ser
205           85           90           95
206 Ser Leu Ala Gly His Ser Phe
207           100

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209 <210> SEQ ID NO: 7

210 <211> LENGTH: 9

211 <212> TYPE: PRT

212 <213> ORGANISM: Artificial Sequence

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W--> 213 <220> FEATURE:
      214 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
      215         Peptide
      217 <400> SEQUENCE: 7
      218 Arg Gly Ser His His His His His
      219   1             5
      221 <210> SEQ ID NO: 8
      222 <211> LENGTH: 30
      223 <212> TYPE: DNA
      224 <213> ORGANISM: Homo sapiens
      226 <400> SEQUENCE: 8
      227 cttaggatcc atggcctcgg aagacattgc           30
      229 <210> SEQ ID NO: 9
      230 <211> LENGTH: 30
      231 <212> TYPE: DNA
      232 <213> ORGANISM: Homo sapiens
      234 <400> SEQUENCE: 9
      235 gtgtgaattc tagaccttgt acagcgtctg           30
      238 <210> SEQ ID NO: 10
      239 <211> LENGTH: 7
      240 <212> TYPE: PRT
      241 <213> ORGANISM: Artificial Sequence
W--> 242 <220> FEATURE:
      243 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
      244         Peptide
      246 <400> SEQUENCE: 10
      247 Arg Gly Ser His His His His
      248   1             5
      250 <210> SEQ ID NO: 11
      251 <211> LENGTH: 9
      252 <212> TYPE: PRT
      253 <213> ORGANISM: Influenza virus
      255 <400> SEQUENCE: 11
      256 Tyr Pro Tyr Asp Val Pro Asp Tyr Ala
      257   1             5
      259 <210> SEQ ID NO: 12
      260 <211> LENGTH: 4
      261 <212> TYPE: PRT
      262 <213> ORGANISM: Homo sapiens
      264 <400> SEQUENCE: 12
      265 His Ser Thr Val
      266   1
      268 <210> SEQ ID NO: 13
      269 <211> LENGTH: 101
      270 <212> TYPE: PRT
      271 <213> ORGANISM: Saccharomyces cerevisiae
      273 <400> SEQUENCE: 13
      274 Met Ser Asp Ser Glu Val Asn Gln Glu Ala Lys Pro Glu Val Lys Pro
      275   1             5             10             15

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RAW SEQUENCE LISTING ERROR SUMMARY DATE: 07/10/2006
PATENT APPLICATION: US/09/484,964A TIME: 12:30:51

Input Set : F:\Utsh248US.TXT
Output Set: N:\CRF4\07102006\I484964A.raw

Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:3; N Pos. 689, 739, 744

Seq#:5; N Pos. 19

VERIFICATION SUMMARY

DATE: 07/10/2006

PATENT APPLICATION: US/09/484,964A

TIME: 12:30:51

Input Set : F:\Utsh248US.TXT

Output Set: N:\CRF4\07102006\I484964A.raw

L:27 M:283 W: Missing Blank Line separator, <220> field identifier
L:30 M:283 W: Missing Blank Line separator, <400> field identifier
L:97 M:283 W: Missing Blank Line separator, <220> field identifier
L:101 M:283 W: Missing Blank Line separator, <220> field identifier
L:105 M:283 W: Missing Blank Line separator, <220> field identifier
L:109 M:283 W: Missing Blank Line separator, <220> field identifier
L:126 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:660
M:341 Repeated in SeqNo=3
L:152 M:283 W: Missing Blank Line separator, <220> field identifier
L:158 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0
L:213 M:283 W: Missing Blank Line separator, <220> field identifier
L:242 M:283 W: Missing Blank Line separator, <220> field identifier